

AMENDMENTS TO THE CLAIMS:

This listing of claims will replace all prior versions and listings of claims in the application:

Listing of Claims:

1. (previously presented) A method of restricting propagation of viruses in a network having a plurality of hosts, said method comprising :

establishing, for a first host of the plurality, a set of records comprising at least a first record which is at least indicative of identities of hosts within the network contacted by a first host, the first record being established by monitoring network activity of the first host;

limiting contact of the first host to other hosts within the network over the course of a first time interval, by allowing the first host to contact any hosts in the first record while preventing the first host from contacting more than a predetermined number of hosts not in the set of records;

wherein the method further comprises an additional selection process for determining which hosts of the plurality the first host is allowed to contact.

2. (original) A method as claimed in claim 1, wherein the first record is indicative of identities of hosts within the network either: to whom data has been sent by the first host; or with whom a socket has been established.

3. (previously presented) A method as claimed in claim 1, wherein the set of records further comprises a second record which identifies destination hosts with whom contact is a priority; and

wherein the additional selection process allows the first host to contact, during the first time interval, any host in the second record.

4. (previously presented) A method as claimed in claim 1, wherein the set of records further comprises a second record which identifies destination hosts with whom contact is a priority and which is indicative of connection characteristics of priority requests to said destination hosts; and

wherein the additional selection process allows, during the first time interval, the first host to permit any request to contact a host in the second record where the request matches the priority request

characteristics in the second record.

5. (original) A method as claimed in claim 3, wherein the second record is established by a user.

6. (original) A method as claimed in claim 3, wherein the second record is established by examining the system configuration of the first host.

7. (previously presented) A method as claimed in claim 1, further comprising :
diverting requests to contact hosts not in the set of records to a delay buffer; and
transmitting the predetermined number of requests from the delay buffer at the end of the first time interval.

8. (previously presented) A method as claimed in claim 7, further comprising
determining a request characteristic indicative of at least one of the origin or the protocol of each request within the delay buffer.

9. (previously presented) A method as claimed in claim 8, wherein the additional selection process comprises selecting the predetermined number of requests for transmission from the delay buffer by:

calculating a number of requests sharing each determined request characteristic;
determining the request characteristic shared by the lowest number of requests as the least common request characteristic; and
selecting for transmission from the delay buffer those requests which have in common the least common request characteristic.

10. (previously presented) A method as claimed in claim 9, wherein the additional selection process further comprises :

determining the next least common request characteristic; and
selecting the requests sharing the next least common characteristic.

11. (previously presented) A method as claimed in claim 8, wherein the additional selection process further comprises :

calculating a number of requests sharing each request characteristic; and
blocking all requests sharing a characteristic where the number of such requests is above a predetermined threshold.

12. (previously presented) A method as claimed in claim 11, wherein the threshold corresponds to 50% of the total number of requests in the buffer at least where the total number of requests exceeds a predetermined minimum threshold.

13. (previously presented) A method as claimed in claim 11, wherein a separate said predetermined threshold is applied for each respective request characteristic.

14. (previously presented) A method as claimed in claim 8, further comprising :
calculating the number of requests sharing each request characteristic; and
removing from the delay buffer all requests sharing a single characteristic where the number of such requests is above a predetermined threshold.

15-21. (canceled)

22. (currently amended) A computing entity in a network comprising a processor, the computing entity being programmed

to establish a set of records comprising at least a first record indicating identities of other entities in the network to whom a communication has been sent,

for the duration of a predetermined interval of time, to allow dispatch of communications to any network entity in the first record while restricting dispatch of communications to other network entities whose identity is not in the set of records to a predetermined number of such entities, and

to perform an additional selection process to determine to which network entities whose identity is not in the first record said computing entity is allowed to dispatch a communication.

23. (canceled)

24. (currently amended) A computing entity in a network comprising a processor, the computing entity being programmed

to establish a set of records comprising at least a first record indicating identities of other entities in the network to whom a communication has been sent,

for the duration of a predetermined interval of time, to allow dispatch of communications to any network entity in the first record while restricting dispatch of communications to other network entities whose identity is not in the set of records, and

to perform an additional selection process to determine to which network entities whose identity is not in the first record said computing entity is allowed to dispatch a communication;

wherein

the additional selection process selects a predetermined number of requests to dispatch a communication to an entity not identified in the set of records; and

the additional selection process operates to:

calculate how many requests to dispatch a communication share a particular characteristic;

determine the request characteristic shared by the lowest number of requests as the least common request characteristic; and

select for transmission those requests which have in common the least common request characteristic.

25. (previously presented) A computing entity according to claim 22, wherein the computing entity is programmed to store requests to dispatch communications to network entities whose identity is not in the record in a buffer.

26. (previously presented) A computing entity according to claim 25, wherein the computing entity is programmed to perform the additional selection process on requests stored in the buffer.

27. (previously presented) A computing entity according to claim 26, wherein requests are stored in the buffer in temporal order, and the additional selection process operates to re-order requests stored in the buffer.

28. (previously presented) A computing entity according to claim 27, wherein a predetermined number of requests to dispatch communication to entities whose identity is not in the first record are dispatched from the buffer with the passing of each predetermined interval of time.

29. (original) A network having a plurality of computing entities according to claim 22.

30. (previously presented) A computing entity according to claim 22, wherein the set of records further comprises a second record which identifies network entities with whom contact is a priority; and

the additional selection process allows the computing entity to dispatch communications, during the predetermined time interval, to any network entity in the second record.

31. (previously presented) A computing entity according to claim 22, wherein the set of records further comprises a second record which identifies network entities with whom contact is a priority and which is indicative of connection characteristics of priority requests to these network entities; and

the additional selection process allows the computing entity to dispatch requests, during the predetermined time interval, to any network entity in the second record where the request matches the priority request characteristics in the second record.

32. (previously presented) A computing entity according to claim 22, wherein the additional selection process operates to

calculate how many requests to dispatch a communication share a particular characteristic, and block dispatch of requests sharing said particular characteristic where the number of such requests is determined to be above a predetermined threshold.